



December 28, 2006

Charles L.A. Terreni
Chief Clerk and Administrator
South Carolina Public Service Commission
Post Office Drawer 11649
Columbia, South Carolina 29211

Re: Carolina Power & Light Company d/b/a Progress Energy Carolinas, Inc.
Power Plant Performance Report (November 2006)
Docket No. 2006-224-E

Dear Mr. Terreni:

Enclosed are an original and one copy of the Power Plant Performance Report for Carolina Power & Light Company d/b/a Progress Energy Carolinas, Inc. for the month of November 2006.

Sincerely,

s/ Len S. Anthony

Len S. Anthony
Deputy General Counsel – Regulatory Affairs

LSA/dhs
Enclosures
45612

c: John Flitter (ORS)

November 2006

The following units had no off-line outages during the month of November:

Brunswick Unit 1
Harris Unit 1
Robinson Unit 2
Roxboro Unit 4

Brunswick Unit 2

Full Forced Outage

- A. Duration: The unit was taken out of service at 18:23 on November 1, and returned to service at 23:56 on November 18, a duration of 413 hours and 33 minutes.
- B. Cause: Startup Auxiliary Transformer / Condenser Tube Leaks
- C. Explanation: The unit was manually shut down due to the loss of the startup auxiliary transformer (SAT). Maintenance activities were conducted to correct the failure of the SAT. Upon completion of repairs to the SAT, startup was delayed due to condenser tube leaks.
- D. Corrective Action: Maintenance activities were performed to repair the startup auxiliary transformer (SAT). Maintenance work included repairs to the flexible links in the bus duct from the SAT to bus 2B. After repairs were made to the SAT, startup of the unit was delayed due to condenser tube leaks. Maintenance work to correct the condenser tube leaks included repairs to condensers and waterboxes, and cleanup of the condensate system. Upon completion of outage activities, including maintenance work, inspections, and testing, the unit was returned to service.

November 2006

Mayo Unit 1

Full Forced Outage

- A. Duration: The unit was taken out of service at 23:17 on November 14, and returned to service at 23:10 on November 15, a duration of 23 hours and 53 minutes.
- B. Cause: Main Steam Line Leak
- C. Explanation: The unit was taken out of service to repair a leak in the main steam line.
- D. Corrective Action: Repairs were made to correct the leak in the main steam line, outage activities were successfully completed, and the unit was returned to service.

Roxboro Unit 2

Full Forced Outage

- A. Duration: The unit was taken out of service at 23:20 on November 1, and returned to service at 13:22 on November 3, a duration of 38 hours and 2 minutes.
- B. Cause: Boiler Reheat Tube Leak
- C. Explanation: The unit was taken out of service to investigate and repair a boiler reheat tube leak.
- D. Corrective Action: Repairs were made to correct the boiler reheat tube leak, and the unit was returned to service.

Full Scheduled Outage

- A. Duration: The unit was taken out of service at 22:11 on November 7, and returned to service at 8:44 on November 8, a duration of 10 hours and 33 minutes.
- B. Cause: Main Transformer
- C. Explanation: The unit was taken out of service to replace the 2A main bank transformer bushing.
- D. Corrective Action: The main transformer bushing was replaced, and the unit was returned to service.

Roxboro Unit 3

Full Scheduled Outage

- A. Duration: The unit was taken out of service at 01:13 on September 30, and returned to service at 21:38 on November 24, a duration of 1,341 hours and 25 minutes.
- B. Cause: Major Turbine Outage and Boiler Inspection
- C. Explanation: The unit was taken out of service for a major turbine outage and boiler inspections.
- D. Corrective Action: The turbine overhaul and the boiler inspection were completed. Periodic, preventative, and corrective maintenance was performed. Planned outage activities were completed, and the unit was returned to service.

Full Forced Outage

- A. Duration: The unit was taken out of service at 03:03 on November 25, and returned to service at 09:50 on November 25, a duration of 6 hours and 47 minutes.
- B. Cause: Turbine Vibration
- C. Explanation: Shortly after returning to service upon completion of the planned turbine outage, the unit tripped due to high turbine vibration.
- D. Corrective Action: Adjustments were made in a timely manner to correct the turbine vibration, which allowed the unit to return to service.

Full Scheduled Outage

- A. Duration: The unit was taken out of service at 02:24 on November 26, and returned to service at 03:38 on November 26, a duration of 1 hour and 14 minutes.
- B. Cause: Turbine Testing
- C. Explanation: The unit was removed from service to perform post-outage turbine overspeed testing and turbine interlock checks.
- D. Corrective Action: The unit was returned to service upon completion of the turbine testing activities.

	Month of November 2006		Twelve Month Summary		See Notes*
	<hr/>		<hr/>		<hr/>
MDC	938 MW		938 MW		1
Period Hours	720 HOURS		8,760 HOURS		
Net Generation	685,785 MWH		7,166,833 MWH		2
Capacity Factor	101.54 %		87.22 %		
Equivalent Availability	98.30 %		85.32 %		
Output Factor	101.54 %		100.49 %		
Heat Rate	10,241 BTU/KWH		10,369 BTU/KWH		
	<hr/> MWH	<hr/> % of Possible	<hr/> MWH	<hr/> % of Possible	
Full Scheduled	0	0.00	562,800	6.85	3
Partial Scheduled	10,407	1.54	42,520	0.52	4
Full Forced	0	0.00	292,813	3.56	5
Partial Forced	1,090	0.16	291,394	3.55	6
Economic Dispatch	0	0.00	0	0.00	7
Possible MWH	675,360		8,216,880		8

* See 'Notes for Nuclear Units' filed with the January 2006 report.

** Gross of Power Agency

	Month of November 2006		Twelve Month Summary		See Notes*
MDC	937 MW		934 MW		1
Period Hours	720 HOURS		8,760 HOURS		
Net Generation	252,407 MWH		7,441,685 MWH		2
Capacity Factor	37.41 %		90.96 %		
Equivalent Availability	37.38 %		89.52 %		
Output Factor	87.90 %		98.37 %		
Heat Rate	10,695 BTU/KWH		10,534 BTU/KWH		
	MWH	% of Possible	MWH	% of Possible	
Full Scheduled	0	0.00	231,001	2.82	3
Partial Scheduled	4,074	0.60	90,009	1.10	4
Full Forced	387,496	57.44	387,496	4.74	5
Partial Forced	30,868	4.58	115,476	1.41	6
Economic Dispatch	0	0.00	0	0.00	7
Possible MWH	674,640		8,181,110		8

* See 'Notes for Nuclear Units' filed with the January 2006 report.

** Gross of Power Agency

	Month of November 2006		Twelve Month Summary		See Notes*
MDC	900 MW		900 MW		1
Period Hours	720 HOURS		8,760 HOURS		
Net Generation	669,468 MWH		7,031,799 MWH		2
Capacity Factor	103.31 %		89.19 %		
Equivalent Availability	99.97 %		88.40 %		
Output Factor	103.31 %		100.82 %		
Heat Rate	10,642 BTU/KWH		10,846 BTU/KWH		
	MWH	% of Possible	MWH	% of Possible	
Full Scheduled	0	0.00	820,800	10.41	3
Partial Scheduled	191	0.03	1,182	0.01	4
Full Forced	0	0.00	79,650	1.01	5
Partial Forced	0	0.00	83,993	1.07	6
Economic Dispatch	0	0.00	0	0.00	7
Possible MWH	648,000		7,884,000		8

* See 'Notes for Nuclear Units' filed with the January 2006 report.

** Gross of Power Agency

	Month of November 2006		Twelve Month Summary		See Notes*
MDC	710 MW		710 MW		1
Period Hours	720 HOURS		8,760 HOURS		
Net Generation	541,935 MWH		6,442,220 MWH		2
Capacity Factor	106.01 %		103.58 %		
Equivalent Availability	100.00 %		99.07 %		
Output Factor	106.01 %		104.23 %		
Heat Rate	10,587 BTU/KWH		10,746 BTU/KWH		
	MWH	% of Possible	MWH	% of Possible	
Full Scheduled	0	0.00	0	0.00	3
Partial Scheduled	0	0.00	14,253	0.23	4
Full Forced	0	0.00	38,802	0.62	5
Partial Forced	0	0.00	4,782	0.08	6
Economic Dispatch	0	0.00	0	0.00	7
Possible MWH	511,200		6,219,600		8

* See 'Notes for Nuclear Units' filed with the January 2006 report.

	Month of November 2006		Twelve Month Summary		See Notes*
MDC	745 MW		745 MW		1
Period Hours	720 HOURS		8,760 HOURS		
Net Generation	353,827 MWH		4,454,218 MWH		2
Capacity Factor	65.96 %		68.25 %		
Equivalent Availability	86.54 %		91.90 %		
Output Factor	68.23 %		72.52 %		
Heat Rate	10,812 BTU/KWH		10,602 BTU/KWH		
	MWH	% of Possible	MWH	% of Possible	
Full Scheduled	17,793	3.32	330,469	5.06	3
Partial Scheduled	4,954	0.92	36,953	0.57	4
Full Forced	0	0.00	40,130	0.61	5
Partial Forced	49,431	9.22	120,791	1.85	6
Economic Dispatch	110,396	20.58	1,543,638	23.65	7
Possible MWH	536,400		6,526,200		8

* See 'Notes for Fossil Units' filed with the January 2006 report.

** Gross of Power Agency

	Month of November 2006		Twelve Month Summary		See Notes*
MDC	670 MW		670 MW		1
Period Hours	720 HOURS		8,760 HOURS		
Net Generation	370,579 MWH		4,791,044 MWH		2
Capacity Factor	76.82 %		81.63 %		
Equivalent Availability	90.01 %		94.64 %		
Output Factor	82.38 %		83.43 %		
Heat Rate	9,368 BTU/KWH		9,381 BTU/KWH		
	<u>MWH</u>	<u>% of Possible</u>	<u>MWH</u>	<u>% of Possible</u>	
Full Scheduled	32,551	6.75	55,175	0.94	3
Partial Scheduled	10,486	2.17	181,837	3.10	4
Full Forced	0	0.00	71,411	1.22	5
Partial Forced	5,160	1.07	6,245	0.11	6
Economic Dispatch	63,624	13.19	763,489	13.01	7
Possible MWH	482,400		5,869,200		8

* See 'Notes for Fossil Units' filed with the January 2006 report.

	Month of November 2006		Twelve Month Summary		See Notes*
MDC	707 MW		707 MW		1
Period Hours	720 HOURS		8,760 HOURS		
Net Generation	34,095 MWH		3,780,880 MWH		2
Capacity Factor	6.70 %		61.05 %		
Equivalent Availability	12.08 %		81.10 %		
Output Factor	34.85 %		72.93 %		
Heat Rate	14,623 BTU/KWH		10,176 BTU/KWH		
	<u>MWH</u>	<u>% of Possible</u>	<u>MWH</u>	<u>% of Possible</u>	
Full Scheduled	411,226	80.78	1,009,265	16.30	3
Partial Scheduled	16,923	3.32	45,868	0.74	4
Full Forced	0	0.00	0	0.00	5
Partial Forced	19,430	3.82	115,146	1.86	6
Economic Dispatch	27,366	5.38	1,239,309	20.01	7
Possible MWH	509,040		6,193,320		8

* See 'Notes for Fossil Units' filed with the January 2006 report.

	Month of November 2006		Twelve Month Summary		See Notes*
MDC	700 MW		700 MW		1
Period Hours	720 HOURS		8,760 HOURS		
Net Generation	343,693 MWH		4,078,403 MWH		2
Capacity Factor	68.19 %		66.51 %		
Equivalent Availability	93.82 %		95.58 %		
Output Factor	68.19 %		67.43 %		
Heat Rate	10,573 BTU/KWH		10,540 BTU/KWH		
	MWH	% of Possible	MWH	% of Possible	
Full Scheduled	0	0.00	77,770	1.27	3
Partial Scheduled	31,144	6.18	161,637	2.64	4
Full Forced	0	0.00	5,600	0.09	5
Partial Forced	0	0.00	25,957	0.42	6
Economic Dispatch	129,163	25.63	1,782,633	29.07	7
Possible MWH	504,000		6,132,000		8

* See 'Notes for Fossil Units' filed with the January 2006 report.

** Gross of Power Agency

Plant	Unit	Current MW Rating	January 2005 - December 2005	November 2006	January 2006 - November 2006
Asheville	1	198	67.75	84.13	73.60
Asheville	2	194	70.36	85.48	60.63
Cape Fear	5	143	71.61	35.17	72.49
Cape Fear	6	173	64.61	74.53	66.23
Lee	1	79	51.59	51.46	48.62
Lee	2	76	51.41	47.53	44.73
Lee	3	252	61.16	41.60	60.43
Mayo	1	745	75.91	65.96	66.74
Robinson	1	174	77.78	84.85	79.63
Roxboro	1	385	77.66	83.96	77.53
Roxboro	2	670	64.35	76.82	81.17
Roxboro	3	707	68.49	6.70	59.76
Roxboro	4	700	67.87	68.19	65.82
Sutton	1	97	51.17	45.11	45.59
Sutton	2	106	54.71	50.45	47.52
Sutton	3	410	59.66	64.16	54.09
Weatherspoon	1	49	44.37	41.39	38.11
Weatherspoon	2	49	42.93	42.78	39.81
Weatherspoon	3	78	61.89	55.88	52.94
Fossil System Total		5,285	67.22	59.41	65.53
Brunswick	1	938	94.38	101.54	86.07
Brunswick	2	937	86.02	37.41	90.56
Harris	1	900	100.59	103.31	87.84
Robinson Nuclear	2	710	92.77	106.01	103.32
Nuclear System Total		3,485	93.49	85.67	91.25
Total System		8,770	77.59	69.85	75.75

Amended SC Fuel Rule
Related to Nuclear Operations

There shall be a rebuttable presumption that an electrical utility made every reasonable effort to minimize cost associated with the operation of its nuclear generation system if the utility achieved a net capacity factor $\geq 92.5\%$ during the 12 month period under review. For the test period April 1, 2006 through November 30, 2006, actual period to date performance is summarized below:

Period to Date: April 1, 2006 to November 30, 2006

Nuclear System Capacity Factor Calculation (Based on net generation)

A. Nuclear system actual generation for SCPSC test period	A =	18,417,511	MWH
B. Total number of hours during SCPSC test period	B =	5,856	hours
C. Nuclear system MDC during SCPSC test period (see page 2)	C =	3,485	MW
D. Reasonable nuclear system reductions (see page 2)	D =	2,222,419	MWH
E. SC Fuel Case nuclear system capacity factor: $[(A+D) / (B+C)] * 100 =$		101.1%	

NOTE:

If Line Item E $\geq 92.5\%$, presumption of utility's minimum cost of operation.

If Line Item E $< 92.5\%$, utility has burden of proof of reasonable operations.

Amended SC Fuel Rule
Nuclear System Capacity Factor Calculation
Reasonable Nuclear System Reductions
Period to Date: April 1, 2006 to November 30, 2006

Nuclear Unit Name and Designation	BNP Unit # 1	BNP Unit # 2	HNP Unit # 1	RNP Unit # 2	Nuclear System
Unit MDC	938 MW	937 MW	900 MW	710 MW	3,485 MW
Reasonable refueling outage time (MWH)	160,194	0	829,590	0	
Reasonable maintenance, repair, and equipment replacement outage time (MWH)	316,117	633,564	79,874	45,402	
Reasonable coast down power reductions (MWH)	2,692	3,591	0	0	
Reasonable power ascension power reductions (MWH)	24,530	70,741	4,019	3,791	
Prudent NRC required testing outages (MWH)	13,843	27,278	36	6,384	
SCPSC identified outages not directly under utility control (MWH)	0	0	0	0	
Acts of Nature reductions (MWH)	0	0	0	774	
Reasonable nuclear reduction due to low system load (MWH)	0	0	0	0	
Unit total excluded MWH	517,376	735,173	913,519	56,351	
Total reasonable outage time exclusions [carry to Page 1, Line D]					2,222,419